STIC Search

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File   2:INSPEC 1969-2004/Apr W3
File   6:NTIS 1964-2004/Apr W4
File   8:Ei Compendex(R) 1970-2004/Apr W3
File  63:Transport Res(TRIS) 1970-2004/Mar
File  65:Inside Conferences 1993-2004/Apr W4
File  81:MIRA - Motor Industry Research 2001-2004/Mar
File  94:JICST-EPlus 1985-2004/Apr W2
File  95:TEME-Technology & Management 1989-2004/Apr W2
File  96:FLUIDEX 1972-2004/Apr
File  99:Wilson Appl. Sci & Tech Abs 1983-2004/Mar
File  34:SciSearch(R) Cited Ref Sci 1990-2004/Apr W3
File 434:SciSearch(R) Cited Ref Sci 1974-1989/Dec
File 103:Energy SciTec 1974-2004/Apr B1
File 144:Pascal 1973-2004/Apr W3
File 266:FEDRIP 2004/Feb
Set     Items   Description
S1     280427   VALVE OR VALVES
S2     518196   ENGINE? ?
S3     125333   INTERNAL()COMBUSTION()ENGINE? ?
S4       4442   AIR()COMPRESSOR? ?
S5    1209285   ROTOR? ? OR ROTARY OR ROTAT?
S6     590857   RECIPRO? OR AXIAL?
S7        100   BALLNUT? ? OR BALL()NUT? ?
S8         18   CAMLESS()VALVE? ?
S9       2412   BALL()SCREW? ? OR BALLSCREW? ?
S10      5525   ENGINE()CYLINDER? ?
S11       868   S1(S)S5(S)S6
S12       180   S3 AND S11
S13     25335   S5(5N)S6
S14       301   S1(S)S13
S15        66   S3 AND S14
S16         0   S7 AND S14
S17    763671   CONVERT???
S18       109   S5(3N)S17(3N)S6
S19        11   S1(S)S18
S20         2   S19 AND S3
S21         2   RD (unique items)
S22         4   S19 AND S2
S23         2   S22 NOT S20
S24         0   (S19 AND S4) NOT (S20 OR S22)
S25         0   S11 AND S7
S26         0   S1 AND S5 AND S6 AND S7
S27         0   S8 AND S9 AND S10
S28        38   S5(S)S6(S)S17(S)S1
S29         4   (S28 AND S3) NOT (S20 OR S22)
S30         3   RD (unique items)
S31         4   (S28 AND (S2 OR S4)) NOT (S20 OR S22 OR S29)
S32         4   RD (unique items)

21/7,K/1     (Item 1 from file: 103)
DIALOG(R)File 103:Energy SciTec
(c) 2004 Contains copyrighted material. All rts. reserv.
02353831   NOV-89-059095; EDB-89-099802
Author(s): Bunk, P.H.
Title: Rotary valve internal combustion engine
Patent No.: US 4815428
```

File 624:McGraw-Hill Publications 1985-2004/Apr 27
File 9:Business & Industry(R) Jul/1994-2004/Apr 27
File 20:Dialog Global Reporter 1997-2004/Apr 28
File 481:DELPHES Eur Bus 95-2004/Apr W2
File 587:Jane`s Defense&Aerospace 2004/Apr W4
File 635:Business Dateline(R) 1985-2004/Apr 27
File 636:Gale Group Newsletter DB(TM) 1987-2004/Apr 28
File 15:ABI/Inform(R) 1971-2004/Apr 27
File 553:Wilson Bus. Abs. FullText 1982-2004/Apr

Set	Items	Description
S1	90571	**VALVE** OR **VALVES**
S2	748202	ENGINE? ?
S3	10488	INTERNAL()COMBUSTION()ENGINE? ?
S4	4379	AIR()COMPRESSOR? ?
S5	215944	**ROTOR**? ? OR **ROTARY** OR **ROTAT**?
S6	85994	RECIPRO? OR **AXIAL**?
S7	57	BALLNUT? ? OR BALL()NUT? ?
S8	9	CAMLESS()**VALVE**? ?
S9	1058	BALL()SCREW? ? OR BALLSCREW? ?
S10	588	ENGINE()CYLINDER? ?
S11	31	S5(7N)S6(S)S1
S12	2	S3(S)S11
S13	**2**	**RD (unique items)**
S14	9	(S11(S)(S2 OR S4)) NOT S12
S15	7	RD (unique items)
S16	2	S15/2001:2004
S17	**5**	**S15 NOT S16**
S18	0	S1(S)S7(S)S5(S)S6
S19	0	S8(S)S9(S)S10

13/6/2 (Item 2 from file: 15)
01177099 98-26494 **USE FORMAT 9 FOR FULL TEXT**
Technology advancements in hearing protection circa 1995: Active noise reduction, frequency/amplitude-sensitivity and uniform attenuation
Feb 1996 LENGTH: 11 Pages
WORD COUNT: 8488

17/9/2 (Item 1 from file: 636)
DIALOG(R)File 636:Gale Group Newsletter DB(TM)
(c) 2004 The Gale Group. All rts. reserv.
01385922 Supplier Number: 41749085 (THIS IS THE FULLTEXT)
R&D Notes: Machinery and Structural Analysis
Navy News & Undersea Technology, v7, n50, pN/A
Dec 24, 1990
ISSN: 8756-1700
Language: English Record Type: Fulltext
Document Type: Newsletter; Trade
Word Count: 307
TEXT:
The Naval Facilities Contracts Office is ready to fund a variety of studies in the areas of machinery diagnostics, computational mechanics, nonlinear structural analysis, near-shore cable installation technology, solutions to nonlinear differential equations, identification of functions for nonlinear systems and arctic geo-technology. In the area of machinery diagnostics the objective of the machinery structural study will be to conduct basic structural acoustics research to identify machine fault conditions by

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File  16:Gale Group PROMT(R) 1990-2004/Apr 28
File 160:Gale Group PROMT(R) 1972-1989
File 148:Gale Group Trade & Industry DB 1976-2004/Apr 28
File 621:Gale Group New Prod.Annou.(R) 1985-2004/Apr 27
File  80:TGG Aerospace/Def.Mkts(R) 1986-2004/Apr 28
File 649:Gale Group Newswire ASAP(TM) 2004/Apr 27
Set     Items   Description
S1     141807   VALVE OR VALVES
S2     854003   ENGINE? ?
S3      20385   INTERNAL()COMBUSTION()ENGINE? ?
S4       7696   AIR()COMPRESSOR? ?
S5     238686   ROTOR? ? OR ROTARY OR ROTAT?
S6      63684   RECIPRO? OR AXIAL?
S7        203   BALLNUT? ? OR BALL()NUT? ?
S8         10   CAMLESS()VALVE? ?
S9       3721   BALL()SCREW? ? OR BALLSCREW? ?
S10      1192   ENGINE()CYLINDER? ?
S11     16997   PC=3519
S12     27142   PC=351
S13     11900   PC=3494
S14       105   S1(S)S5(7N)S6
S15         0   S3(S)S14
S16        27   (S2 OR S4)(S)S14
S17         1   S11:S13 AND S16
S18        26   S16 NOT S17
S19        22   RD (unique items)
S20         0   S19/2001:2004
S21        22   Sort S19/ALL/PD,A
S22         4   (S14 AND S11:S13) NOT S16
S23         3   RD (unique items)
S24         0   S1(S)S5(S)S6(S)S7
S25         0   S8(S)S9(S)S10
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 17/3,AB,K/1     (Item 1 from file: 148)
DIALOG(R)File 148:Gale Group Trade & Industry DB
(c)2004 The Gale Group. All rts. reserv.
08695365     SUPPLIER NUMBER: 18305140    (USE FORMAT 7 OR 9 FOR FULL TEXT)
The engine testing process at Chrysler. (Chrysler Corp.)
Jost, Kevin
Automotive Engineering, v104, n3, p63(4)
March, 1996
ISSN: 0098-2571      LANGUAGE: English      RECORD TYPE: Fulltext; Abstract
WORD COUNT:   2393    LINE COUNT:  00199
ABSTRACT:  Chrysler Corp. is relying on traditional testing concepts in
designing a new 2.7-L V6 engine for the 1998 Dodge Interpid/Chrysler
Concorde successor. These concepts involve performance and mechanical
durability/development tests that allow Chrysler engineers to make reliable
calibrations and test the durability of various engine components, such as
manifolds, crankshafts, cylinder blocks and pistons. All tests are carried
out from the design stage up to the production stage.
...      800 hours at WOT, which is equivalent to customer operation for
160,000 km. The  engine -speed range for the cycle is  engine  specific;
for the 2.7-L V6, it is 2400-6000 rpm. For this program,  engines
completing the first 800 h will be taken apart, rebuilt, and run through
another 800...
...h test is a good predictor of rotating and reciprocating component
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File   2:INSPEC 1969-2004/Apr W3
File   6:NTIS 1964-2004/Apr W4
File   8:Ei Compendex(R) 1970-2004/Apr W3
File  63:Transport Res(TRIS) 1970-2004/Mar
File  65:Inside Conferences 1993-2004/Apr W4
File  81:MIRA - Motor Industry Research 2001-2004/Mar
File  94:JICST-EPlus 1985-2004/Apr W2
File  95:TEME-Technology & Management 1989-2004/Apr W2
File  96:FLUIDEX 1972-2004/Apr
File  99:Wilson Appl. Sci & Tech Abs 1983-2004/Mar
File  34:SciSearch(R) Cited Ref Sci 1990-2004/Apr W3
File 434:SciSearch(R) Cited Ref Sci 1974-1989/Dec
File 103:Energy SciTec 1974-2004/Apr B1
File 266:FEDRIP 2004/Feb
File 144:Pascal 1973-2004/Apr W3
Set     Items   Description
S1    2378553   LINEAR? OR LINEAL?
S2     280431   VALVE OR VALVES
S3     518199   ENGINE? ?
S4     125333   INTERNAL()COMBUSTION()ENGINE? ?
S5       4442   AIR()COMPRESSOR? ?
S6    1209293   ROTOR? ? OR ROTARY OR ROTAT?
S7     590858   RECIPRO? OR AXIAL?
S8        100   BALLNUT? ? OR BALL()NUT? ?
S9         18   CAMLESS()VALVE? ?
S10      2412   BALL()SCREW? ? OR BALLSCREW? ?
S11      5525   ENGINE()CYLINDER? ?
S12       191   S2(S)S6(7N)S1 NOT S7
S13         7   S12(S)S3:S5
S14         7   RD (unique items)
S15         0   S14/2001:2004
S16        18   S2:S4 AND S9
S17        15   S3:S5 AND S9
S18         8   RD (unique items)
S19         8   S18 NOT S13

 14/6/2     (Item 1 from file: 6)
0142675  NTIS Accession Number: AD-666 796/XAB
  Investigation of Coordinated Free Turbine Engine Control Systems for
Multiengine Helicopters
  (Final rept. 2 Dec 66-15 Jul 67)
  Dec 67

 14/6/3     (Item 1 from file: 8)
01574761
  Title: AUTOMOTIVE CONTROL ACTUATORS: AN OVERVIEW.
  Publication Year: 1984

 14/6/4     (Item 1 from file: 81)
48979
 Towards the Clean Car Engine
March 1, 1986

 14/6/5     (Item 1 from file: 103)
04373238   KR-99-000061; EDB-99-009602
Title: Studies of valve lifter for automotive heavy duty diesel engine by
```

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File  16:Gale Group PROMT(R) 1990-2004/Apr 28
File 160:Gale Group PROMT(R) 1972-1989
File 148:Gale Group Trade & Industry DB 1976-2004/Apr 28
File 621:Gale Group New Prod.Annou.(R) 1985-2004/Apr 27
File  80:TGG Aerospace/Def.Mkts(R) 1986-2004/Apr 28
File 635:Business Dateline(R) 1985-2004/Apr 27
File 636:Gale Group Newsletter DB(TM) 1987-2004/Apr 28
File  15:ABI/Inform(R) 1971-2004/Apr 27
File 553:Wilson Bus. Abs. FullText 1982-2004/Apr
File 624:McGraw-Hill Publications 1985-2004/Apr 27
File   9:Business & Industry(R) Jul/1994-2004/Apr 27
File 481:DELPHES Eur Bus 95-2004/Apr W2
File 587:Jane`s Defense&Aerospace 2004/Apr W4
File  20:Dialog Global Reporter 1997-2004/Apr 28
Set     Items   Description
S1     221608   VALVE OR VALVES
S2    1501010   ENGINE? ?
S3      28479   INTERNAL()COMBUSTION()ENGINE? ?
S4      11495   AIR()COMPRESSOR? ?
S5     438761   ROTOR? ? OR ROTARY OR ROTAT?
S6     144424   RECIPRO? OR AXIAL?
S7        257   BALLNUT? ? OR BALL()NUT? ?
S8         18   CAMLESS()VALVE? ?
S9       4722   BALL()SCREW? ? OR BALLSCREW? ?
S10      1710   ENGINE()CYLINDER? ?
S11    257746   LINEAR? OR LINEAL?
S12       213   S5(7N)S11(S)S1 NOT S6
S13         8   S12(S)S2:S4
S14         7   RD (unique items)
S15         6   S2:S4 (S)S8
S16         6   RD (unique items)

 14/6/3     (Item 2 from file: 160)
00645358
RFF  Engineering  has introduced Autosteer pneumatic steering mechanism for
     trucks  and buses that offers reduced power consumption and substantial
     weight savings.
May, 1981

 14/6/4     (Item 1 from file: 148)
07595859      SUPPLIER NUMBER: 15919267     (USE FORMAT 7 OR 9 FOR FULL TEXT)
PRNDL-box 4T60E. (Hydra-matic 4T60E electronic automobile transaxle)
Nov, 1994
WORD COUNT:   1866     LINE COUNT:  00147

 14/6/5     (Item 2 from file: 148)
02029690      SUPPLIER NUMBER: 03077008     (USE FORMAT 7 OR 9 FOR FULL TEXT)
Drives and drive controls. (1984 Productivity Reference Issue and Buyer's
  Guide)
Jan, 1984
WORD COUNT:   3743     LINE COUNT:  00317

 14/6/6     (Item 1 from file: 15)
00628500  92-43440                    **USE FORMAT 9 FOR FULL TEXT**
Velocity Control Goes Digital
Jul 23, 1992   LENGTH: 5 Pages
```

File 350:Derwent WPIX 1963-2004/UD,UM &UP=200427
File 347:JAPIO Nov 1976-2003/Dec(Updated 040402)
File 371:French Patents 1961-2002/BOPI 200209

Set	Items	Description
S1	785449	**VALVE** OR **VALVES**
S2	607285	ENGINE? ?
S3	130725	INTERNAL()COMBUSTION()ENGINE? ?
S4	9608	AIR()COMPRESSOR? ?
S5	2016600	**ROTOR**? ? OR **ROTARY** OR **ROTAT**?
S6	663322	RECIPRO? OR **AXIAL**?
S7	1798	BALLNUT? ? OR BALL()NUT? ?
S8	15	CAMLESS()**VALVE**? ?
S9	8200	BALL()SCREW? ? OR BALLSCREW? ?
S10	7303	ENGINE()CYLINDER? ?
S11	7029	IC=(F01L-009/04 OR F01L-003/24 OR F16K-031/04)
S12	16515	S1 AND S5 AND S6
S13	19	S7 AND S12
S14	**1**	**S2:S4 AND S13**
S15	1565	(S12 AND S3) NOT S14
S16	87787	S5(7N)S6
S17	4665	S16(S)S1
S18	180	S3(S)S17
S19	9	S11 AND S18
S20	**9**	**S19 NOT S14**
S21	683	((S2 OR S4)(S)S17) NOT (S14 OR S19)
S22	**16**	**S11 AND S21**
S23	6	S17(S)S7
S24	**6**	**S23 NOT (S20 OR S22)**
S25	0	S2:S4 AND S24

14/19,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
(c) 2004 Thomson Derwent. All rts. reserv.
013697224 **Image available**
WPI Acc No: 2001-181448/200118
XRPX Acc No: N01-129380

Variable valve timing mechanism of IC engine , has timing drive assembly in which camshaft and quill shaft are movably connected, and control assembly which moves quill shaft by ball nut transmission

Patent Assignee: DAIMLERCHRYSLER CORP (DAIM)
Inventor: REGUEIRO J F
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
US 6167854	B1	20010102	US 99283019	A	19990401	200118	B

Priority Applications (No Type Date): US 99283019 A 19990401
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
US 6167854	B1		10	F01L-001/344	

Abstract (Basic): US 6167854 B1

NOVELTY - One end of a quill shaft (24) is directly connected to a hollow camshaft (22) through splines (42) and indirectly connected to the hub (34) of a drive gear (20) via helical splines (46), in a timing drive assembly (12). On **rotation** of a **ball nut** transmission, a sleeve and quill shaft move **axially** to the camshaft and helical splines and cause the camshaft to change angular position.

File 348:EUROPEAN PATENTS 1978-2004/Apr W02
File 349:PCT FULLTEXT 1979-2002/UB=20040415,UT=20040408

Set	Items	Description
S1	192675	**VALVE** OR **VALVES**
S2	115397	ENGINE? ?
S3	37870	INTERNAL()COMBUSTION()ENGINE? ?
S4	5058	AIR()COMPRESSOR? ?
S5	541970	**ROTOR**? ? OR **ROTARY** OR **ROTAT**?
S6	321069	RECIPRO? OR **AXIAL**?
S7	979	BALLNUT? ? OR BALL()NUT? ?
S8	27	CAMLESS()**VALVE**? ?
S9	3902	BALL()SCREW? ? OR BALLSCREW? ?
S10	3948	ENGINE()CYLINDER? ?
S11	935	IC=(F01L-009/04 OR F01L-003/24 OR F16K-031/04)
S12	50438	S5(7N)S6
S13	2257	S12(20N)S1
S14	0	S7(S)S14
S15	**2**	**S7(S)S13**
S16	0	S2:S4(S)S15
S17	130	S13(S)S3
S18	**5**	**S11 AND S17**
S19	379	S13(S)(S2 OR S4) NOT S18
S20	**5**	**S11 AND S19**
S21	0	S8(S)S9(S)S10
S22	393398	CONVERT???
S23	232	S22(10N)S5(10N)S6(10N)S1
S24	50	S2:S4(S)S23
S25	50	S24 NOT (S18 OR S20)
S26	0	S7(S)S25
S27	**14**	**S3(S)S23**
S28	2	S25 AND S11
S29	**2**	**S28 NOT S27**
S30	**34**	**S25 NOT S27:S28**

15/6/1 (Item 1 from file: 348)
01432039
Magnetostrictive sensor

15/6/2 (Item 2 from file: 348)
00793498
Power steering assist

18/3,AB,K/1 (Item 1 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS
(c) 2004 European Patent Office. All rts. reserv.
01292046
A method for controlling electromagnetic actuators for operating induction and exhaust valves of internal combustion engines
Verfahren zur Steuerung von elektromagnetischen Aktoren zum Betreiben der Einlass- und Ausslass-Ventile in einer Brennkraftmaschine
Procede de commande d'actionneur electromagnetiques de soupapes d'admission et d'echappement de moteur a combustion interne
PATENT ASSIGNEE:
MAGNETI MARELLI S.p.A., (710662), Via Griziotti 4, 20145 Milano, (IT),
(Applicant designated States: all)
INVENTOR:

File 350:Derwent WPIX 1963-2004/UD,UM &UP=200427
File 347:JAPIO Nov 1976-2003/Dec(Updated 040402)
File 371:French Patents 1961-2002/BOPI 200209

Set	Items	Description
S1	785449	**VALVE** OR **VALVES**
S2	607285	ENGINE? ?
S3	130725	INTERNAL()COMBUSTION()ENGINE? ?
S4	9608	AIR()COMPRESSOR? ?
S5	2016600	ROTOR? ? OR ROTARY OR ROTAT?
S6	663322	RECIPRO? OR AXIAL?
S7	1798	BALLNUT? ? OR BALL()NUT? ?
S8	15	CAMLESS()**VALVE**? ?
S9	8200	BALL()SCREW? ? OR BALLSCREW? ?
S10	7303	ENGINE()CYLINDER? ?
S11	352279	**LINEAR**? OR **LINEAL**?
S12	410	(S1 AND S2:S4 AND S5 AND S11) NOT S6
S13	698	S5(7N)S11(S)S1
S14	68	S2:S4(S)S13
S15	49	S14 NOT S6
S16	7029	IC=(F01L-009/04 OR F01L-003/24 OR F16K-031/04)
S17	**2**	**S15 AND S16**
S18	0	S7(S)S14
S19	0	S7 AND S14
S20	2	S7(S)S13
S21	0	S2:S4 AND S20

17/34/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX

015350325 **Image available**
WPI Acc No: 2003-411263/200339
Electromagnetic drive unit for valves of internal combustion engine **used in motor vehicles, has** rotary **cam whose contact surfaces have linear portions**
Patent Assignee: UNISIA JECS CORP (NIEJ)
Number of Countries: 001 Number of Patents: 001
Patent Family:

Patent No	Kind	Date	Applicat No	Kind	Date	Week	
JP 2003129808	A	20030508	JP 2001323944	A	20011022	200339	B

Priority Applications (No Type Date): JP 2001323944 A 20011022
Patent Details:

Patent No	Kind	Lan	Pg	Main IPC	Filing Notes
JP 2003129808	A		9	F01L-009/04	

Abstract (Basic): JP 2003129808 A

NOVELTY - Contact surfaces (50,51) of a rotary cam (46) have respective **linear** portions (50b,50d) and (51b,51d) formed such that the speed of the cam which contacts a follower is fixed, at the **linear** portions.

USE - For inlet **valve** and exhaust **valve** in internal combustion engine of motor vehicle.

ADVANTAGE - Enables complete braking of the inlet **valve** or exhaust **valve**, without impacting the **valve** seat, due to provision of the **linear** portions in the contact surfaces of the cam. Stabilization of switching operation of the **valve** is achieved. Since the cam has **linear** portions, fabrication of the cam is made easy.

DESCRIPTION OF DRAWING(S) - The figure shows the enlarged front

File 348:EUROPEAN PATENTS 1978-2004/Apr W02
File 349:PCT FULLTEXT 1979-2002/UB=20040415,UT=20040408

Set	Items	Description
S1	192675	**VALVE** OR **VALVES**
S2	115397	ENGINE? ?
S3	37870	INTERNAL()COMBUSTION()ENGINE? ?
S4	5058	AIR()COMPRESSOR? ?
S5	541970	ROTOR? ? OR ROTARY OR ROTAT?
S6	321069	RECIPRO? OR AXIAL?
S7	979	BALLNUT? ? OR BALL()NUT? ?
S8	27	CAMLESS()**VALVE**? ?
S9	3902	BALL()SCREW? ? OR BALLSCREW? ?
S10	3948	ENGINE()CYLINDER? ?
S11	935	IC=(F01L-009/04 OR F01L-003/24 OR F16K-031/04)
S12	361871	**LINEAR**? OR **LINEAL**?
S13	460	S5(7N)S12(20N)S1 NOT S6
S14	70	S2:S4(S)S13
S15	**2**	**S11 AND S14**
S16	**6**	**S14/TI,DE,AB NOT S15**
S17	**8**	**(S1/TI,DE AND S14) NOT S15:S16**

15/3,AB,K/1 (Item 1 from file: 348)
DIALOG(R)File 348:EUROPEAN PATENTS

01228883
METHOD AND DEVICE FOR OPENING AND CLOSING A VALVE OF AN INTERNAL COMBUSTION ENGINE
VERFAHREN UND VORRICHTUNG ZUM OFFNEN UND SCHLIESSEN EINES VENTILS EINES VERBRENNUNGSMOTORS
PROCEDE ET DISPOSITIF POUR OUVRIR ET FERMER UNE SOUPAPE D'UN MOTEUR A COMBUSTION INTERNE
PATENT ASSIGNEE:
MAHLE Ventiltrieb GmbH, (2901430), Haldenstr. 7, 70376 Stuttgart, (DE), (Proprietor designated states: all)
INVENTOR:
ABELE, Marcus, Dekan-Fellhauer-Strasse 9, D-76359 Marxzell-Burbach, (DE)
GLAS, Thomas, Beutelsbacher Strasse 11, D-73630 Remshalden, (DE)
LECHNER, Martin, Im Feldle 24, D-70378 Stuttgart, (DE)
STEINMETZ, Christoph, Wunnensteinstrasse 18/3, D-71634 Ludwigsburg, (DE)
LEGAL REPRESENTATIVE:
Pohle, Reinhard (66243), Mahle GmbH Patentabteilung, Pragstrasse 26-46, 70376 Stuttgart, (DE)
PATENT (CC, No, Kind, Date): EP 1175553 A1 020130 (Basic)
EP 1175553 B1 030730
WO 2000066883 001109
APPLICATION (CC, No, Date): EP 2000922604 000405; WO 2000EP2996 000405
PRIORITY (CC, No, Date): DE 19919734 990430
DESIGNATED STATES (Pub A): AT; BE; CH; CY; DE; DK; ES; FI; FR; GB; GR; IE; IT; LI; LU; MC; NL; PT; SE; (Pub B): DE; FR; GB; IT
INTERNATIONAL PATENT CLASS: **F01L-009/04**
NOTE: No A-document published by EPO
LANGUAGE (Publication,Procedural,Application): German; German; German
FULLTEXT AVAILABILITY:

Available Text	Language	Update	Word Count
CLAIMS B	(English)	200331	416
CLAIMS B	(German)	200331	376